



## 'UNIQUE CARS', December 24, 2007

Writer: David Dowsey

Region: Australia

Publisher: Fairfax

Ask anybody to name Aussie sport's biggest icons and Don Bradman and Dawn Fraser will be on most peoples' lists. Ron Clarke, Rod Laver and Thorpie might get a mention too. But for anybody who really knows their sport the name Jack Brabham will be right up there too.

Sir Jack won three World Formula One titles and was knighted for his services to motorsport. But Brabham's real claim to fame is that he won a World Championship driving a car of his own manufacture, the BT19 in 1966. He's the only person to do it and in these days of specialization and the multi-billion dollar world of modern Formula One it looks like that record will stay intact.

Cue 37-year old Victorian Mat Thomas. He's not out to steal Sir Jack's lofty F1 record but in the world of sportscar racing Thomas wants to emulate Brabham's feat by building and racing his own Aussie car at Le Mans.

You may remember Thomas from his 2004 Melbourne and Sydney motor show unveilings of his JOSS Supercar. The JOSS grabbed the headline and appeared in dozens of publications around the Globe. But that was nearly three years ago. The bright lights have long since dimmed and the project has stalled. So what has happened? As we found out there are big plans on the horizon....

From a 'car family' Thomas had a life changing experience car-themed European family holiday in 1987 he visited several manufacturers including Porsche, Jaguar, Mercedes-Benz and TWR at the time Tom Walkinshaw's 'Silk Cut' Jaguars were making an assault on Le Mans; a race he attended and which left a deep impression.

"Le Mans was awe inspiring," recalls Thomas. "Its country against country and it's a shame Australia is not represented car-wise."

There, in the comment lies the heart of Thomas' mission. "My biggest aim in life is to do what Jack Brabham has done – but with GT cars," he explains.

"You need road car sales to exist as a company but we have designed the JOSS within Le Mans regulations with the sole purpose of eventually racing. That's why I have always kept my hand in with the sprint karting and 250cc super-karting with the hope that one day I can race at Le Mans."

Thomas decided early on what he wanted to do in life and studied Industrial Design majoring in automotive and clay modelling at uni. After graduating though he found it difficult getting a job.

"I went overseas to arm myself with the tools I needed to build the JOSS so I sold everything I had and went over to England.

*Cont'd 'UNIQUE CARS', December 24, 2007*

I worked at Futura as a clay modeller in Birmingham from 1994 doing prototypes and show cars for companies like Bentley and Aston Martin.

“Then I went to Stewart Formula One as a wind tunnel model maker. I loved Jackie Stewart and it was a one-off opportunity.

While I was there I made sure I picked the brains of the aerodynamicist before I left.”

Thomas went back to clay modelling and returned to Australia in 1998 to start the JOSS project. He rented a factory in Warragul (Victoria) and began a 40 percent clay model before graduating to a full-size foam and wood mock-up.

At the same time Thomas was researching different chassis eventually deciding the Ultima was best for his purposes. He had one shipped out from England and began a full-size clay version of the car, cast that up and put it on the chassis. The drivertrain was the next priority.

On the advice of a family friend Thomas became aware of an aluminium block being made by a Melbourne-based company. On a visit they showed him the first block fresh out of the foundry – Thomas couldn't believe the timing. “It was a 383ci block which could possibly be bored up to about 410ci. So we thought we would go ahead with that but that aluminium engine went to another car. So we started testing with an iron block version of the engine that was supposedly developing around 450bhp (336kW); later we realised it was only giving out 320bhp (239kW).

When we tested the car we got a 3.7sec 0-100km/h without a limited-slip diff and only 320bhp and 11.9 quarter mile at 130mph (209km/h).” Matt reckons maximum velocity is around 300km/h.

“We were hoping to crack the McLaren F1 road car's time first up but although we didn't do that we showed great signs. The car was obviously spinning off the line having only one wheel driving but it actually out-accelerated the McLaren when we got traction so things were promising for the future”.

Looking then to promote the car Thomas asked the organisers from the Melbourne motor show to view his full-size model and the test mule chassis impressed, they offered a central stand. Thomas now had a deadline and got the car to the show; tested, painted and ready in only three months.

“We had a lot of interest at the show, Murray Walker congratulated me on how good the car looked. Next time I went to England I called him up and we went out to lunch.

“We received four firm orders in Melbourne, two in Sydney and another 12-15 people interested. I was full of self doubt going to the show but the great response validated all the hard work.

“When I was in Europe I worked on the sketches for about two years. I could have gone more cutting edge with my styling but for a new company I thought we needed something solid to establish ourselves. I call it a “black suited” design, meaning it will always be a trend. The shape that people saw was designed six years earlier and now in 2006 the design is eight years old and still looks quite modern”.

‘Mule it might be but the JOSS still has a delicious specification. The Ultima chassis has 100mm ground clearance, is 4300mm long with a wheelbase of 2560mm and width of 1840mm for ultimate handling; Matt says it makes 1.3 lateral G force. “The car's only 1m high,” he says. “I did this with the Mulsanne Straight (at Le Mans) in mind.

*Cont'd 'UNIQUE CARS', December 24, 2007*

"The body was cast in polydour (a mixture of plaster and fibreglass) and then laid up with GRP with carbon and Kevlar for reinforcement. The screens are polycarbonate."

Suspension is a McPherson set-up with adjustable springs. Brakes are Australian Harrop 335mm discs all-round; the rear wheels are 18x13.5 inch and 18x8 inch up-front. Best of all the car weighs only 940kg, with half a tank of fuel.

Thomas' 'mule' was the bait in his search for finance to kick start JOSS Developments. Looking for \$12-13 million the last two years have seen his hopes come to naught. In the meantime Thomas says he's had more orders that he can't fill – JOSS simply doesn't have the money to go to the next level of development.

"We needed to secure investment straight away because the design lessens the longer we wait. We had a lot of promises and people did try. But we also came up against people who tried to rip us off. In one meeting a person asked if JOSS Racing was still available as a trademark. I said it was but we found out during the meeting that it had been registered by this person and then they tried to sell back 40 percent.

"We had a lot of offers from component suppliers but we are still having trouble raising capital. What we want to do next time is develop the car and have it road registerable and ready for sale on the spot. The car raised a lot of interest in the company but it was not quite near the performance we wanted."

That hasn't stopped Thomas from developing ideas and concepts for the 'production' JOSS. "Now we are thinking of going for a chromemoly space frame rather than a full composite tub. There won't be much difference in weight, torsional rigidity shouldn't be affected much and we can still go for a carbon fibre body. It will be cheaper too.

"With that package it should weigh around 850kg and depending on which engine we use we should have between 600-800bhp," he says.

"The power-to-weight ratio is nearly double that of the McLaren or Bugatti Veyron and yet we are trying to keep it drivable and user-friendly while keeping it within the guidelines to take it to Le Mans eventually. Why on earth can't Australia have a car at Le Mans competing with the rest of the world?"

Thomas is single minded in his performance pursuits for the next JOSS model. "What we are looking for is 2.7secs 0-100km/h; we want to be the fastest car in the world. The 'mule' did its job but we want to move on.

"Styling-wise we don't want to move too far away from what we have now – we'll just detail it a lot more and delve more deeply into craftsmanship and build quality. Our production car needs a different engine with more performance and different gearbox and a little different styling. The next car is also going to have a fully-formed interior.

"We are at the point though now where we have exhausted all possible avenues for investment in Australia. I so desperately wanted to keep this product totally Australian but that is looking increasingly more difficult. I have been in 30 business meetings concerning investment since the Melbourne motor show, spent countless hours developing and adjusting our business plan, responded to hundreds of emails and made countless phone calls – in the end all for naught.

*Cont'd 'UNIQUE CARS', December 24, 2007*

“Even the meetings with governmental departments only proved that they would not support us unless we were already turning a strong profit that they could tap into,” says Thomas. “At one stage we were even told they could only support foreign companies coming into the area; not Australian ones.

“Over the last couple of years we have received quite a lot of interest from other parts of the Globe, so it is that which now drives me to travel to Europe to work and to secure investment. This will allow me the time and resources to commence some serious talks with those interested in our project.”

“Our main aim at the moment is to go to Le Mans which may be a bigger drawcard to potential sponsors – I have read 217 million people watch Le Mans live on TV. This may then afford us the ability to create the production cars. We need to get our Aussie car onto the Le Mans grid to create our own race history.”

“We are very keen to sell our ‘test mule’ to further development and bring that final goal closer. This will be an awesome piece of Australian automotive history. If we succeed as a company this will always be the first JOSS and therefore first ever Australian Supercar. If JOSS does not succeed then the car will always have its place in history as the only JOSS Supercar.”

“Either way it’s a good investment. With the 17,000 man hours and parts the car is worth around \$1million yet we will be asking for offers over \$180,000. The parts alone are worth much more than this. The mule will come with certain guidelines to protect our copyrights and cannot be road registered, but by god what a great track-day special to drag out.”